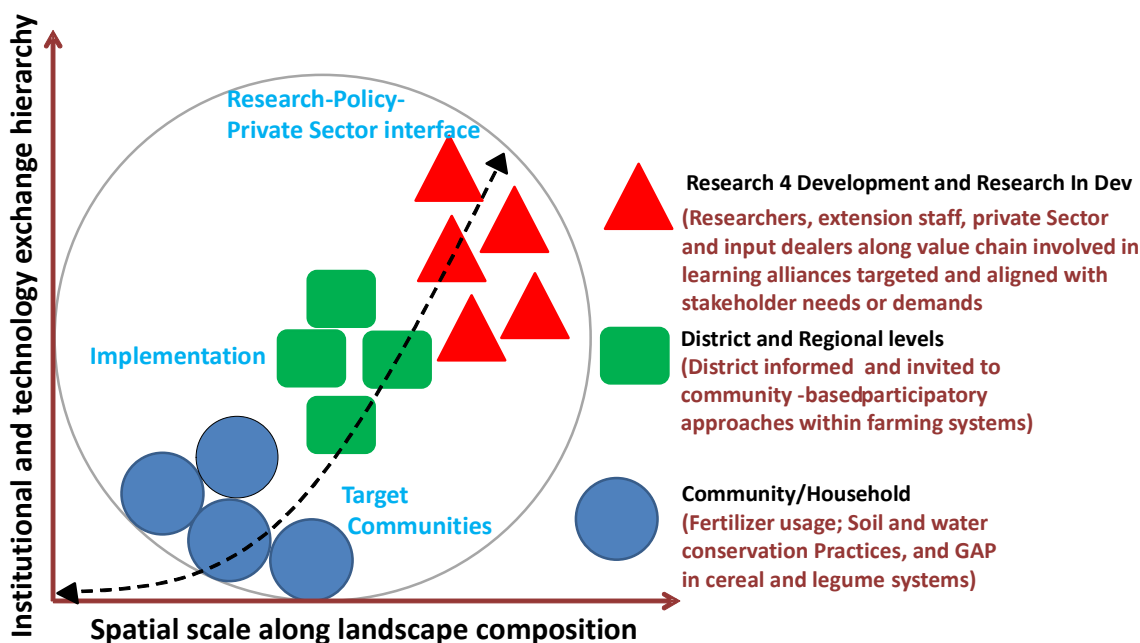




The changing face of farming in Tanzania: The embracing case for ICT to empower smallholder farmers

By Fred Kizito- IITA-CIAT; AR NAFKA Scaling Project

One of the major bottlenecks for agricultural research and development is; why in several instances smallholder farmers don't adopt agricultural innovations and technologies despite their (seemingly obvious) ability to improve their livelihoods. While various arguments have been made on a technology-by-technology basis, one aspect that is always a starting point for this evaluation has always been – how is the information dissemination provided to the target communities? Is it given in a way that helps improve capacity in decision making against major negative externalities? For the past six years, the USAID-funded Africa RISING-NAFAKA partnership have been engaged in agricultural research and scaling activities (through participatory approaches) with the goal of improving the livelihoods of thousands of smallholder farmers in 10 districts of Tanzania. While the focus of the program (and the scientists) initially was predominantly on validating the technologies through participatory research with farmers, the team is now working with concerted efforts to get the technologies into use by thousands of farmers beyond the communities where the validation was done. This greater expectation and focus is changing how the project team is going about the business of engagement by using innovative ICT techniques to complement agricultural extension efforts as exemplified in the conceptual scaling representation below.



Scaling conceptual representation across institutional hierarchies and spatial scales **Source: Author**

In collaboration with ESOKO, the Africa RISING-NAFAKA Program is changing the face of farming in Tanzania. It is reaching out to 1000s of farmers in Tanzania (13,700 target users) in 10 districts namely Babati, Iringa Rural, Kongwa, Momba, Kilombero, Mufindi, Mbozi, Kilolo, Mbarali and Wanging'ombe. The partnership with ESOKO has helped deploy mobile and web technologies that bring farming advice, weather forecasts, market information, and financial tips to farmers (through the use of SMS and web tools), who are traditionally out of reach, due to barriers in connectivity, literacy, or language. This will likely attract more youth into farming but has also helped leapfrog major barriers for smallholder farmers. The Africa RISING NAFKA Program has focused on working directly with smallholder farmers because in Sub-Saharan Africa, cultural inclinations are deeply seated, and just as many farmers initially rejected inorganic fertilizers, fearing that they would irreversibly poison the land, individuals may be resistant to changing their farming methods. The Africa RISING NAFKA-ESOKO partnership is transforming farmers from doubters into believers by using field demonstrations to show that new technologies can deliver better results. The partnership then uses digital technology to tap into the vast potential for farmers, agro-dealers and agricultural extension agents to improve smallholder farmer awareness and capacity towards adaptation to climate change, increase the efficiency of food production and enhance the subsequent linkage to vital market outlets. This could bring major economic, social, and environmental benefits.